

Seniors' Online Communities: A Quantitative Content Analysis

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Purpose: To examine the contents and characteristics of seniors' online communities and to explore their potential benefits to older adults. **Design and Methods:** Quantitative content analysis of a full year's data from 14 leading online communities using a novel computerized system. The overall database included 686,283 messages. **Results:** There was a constant increase in the daily activity level during the research period. Content analysis identified 13 main subjects discussed in the communities, including (in descending order) "Fun on line," "Retirement," "Family," "Health," "Work and Study," "Recreation" "Finance," "Religion and Spirituality," "Technology," "Aging," "Civic and Social," "Shopping," and "Travels." The overall tone was somewhat more positive than negative. **Implications:** The findings suggest that the utilities of Information and Communications Technologies for older adults that were identified in previous research are valid for seniors' online communities as well. However, the findings suggest several other possible benefits, which may be available only to online communities. The communities may provide social support, contribute to self-preservation, and serve as an opportunity for self-discovery and growth. Because they offer both leisure activity and an expanded social network, it is suggested that active participation in the communities may contribute to the well-being of older adults. Directions for future research and applied implications are further discussed.

Key Words: Internet, Communication, Social networks, Leisure

The impact of social networks (SNs) on older adults' well-being has become a key issue in gerontology research in the past two decades. Although

social relationships may not always be supportive (Ingersoll-Dayton, Morgan, & Antonucci, 1997; Lang & Baltes, 1997), most seniors report more positive than negative aspects of their social relationships (Dykstra, 1990; Rook, 1990) and perceive having good social relationships as prerequisite for quality of life in old age (Gabriel & Bowling, 2004). Social support affects Psychological Well-Being (PWB) by helping people to cope effectively with stressful life events (Antonucci & Akiyama, 1991), strengthening personal control and self-worth (Krause, 1987), fostering hope and optimism (Nunn, 1996), and enhancing sheer mental stimulation and active social engagement (Rowe & Kahn, 1998). There is also evidence for SN's impact on physical and health status (Avlund et al., 2004).

The SNs of aging individuals may be comprised of family and friends, as well as neighbors, colleagues, and professional staff. They tend to be dominated by kin (Phillipson, Bernard, Phillips, & Ogg, 2002). However, most findings suggest that friend-dominant SNs have a stronger impact on PWB than family-dominant SNs (e.g., Litwin, 1999; Pinquart & Sorensen, 2000). Moreover, friendship roles and identity emerged as the strongest predictor of PWB, even stronger than income or marital status (Siebert, Mutran, & Reitzes, 1999).

The changes that characterize old age have various effects on older adults' SNs, as well as on the opportunities they have for meeting with family and friends. Some of those changes may involve new constraints, such as lower income or poorer health. In addition, there is also loss of friends as a result of retirement, relocation, physical or mental disability, or death. Yet, an individual's SN is dynamic even at a very old age and compensations are often found. Strategies for compensation includes acquiring new friends, changing roles of existing relationships, extending the meaning of the term "friend" so that more people can be included in that category and openness to more types of relationships (Jerrome &

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Wenger, 1999). Using the Internet may be considered as another strategy for compensation. Although it may facilitate maintaining existing relationships, it can also provide contexts for forming new friendships.

The cybernetic revolution did not bypass the senior population. The percentage of Internet users among people who are 60 years old and over is still much lower than among younger age groups (20%–50% vs. 70%–90%), and online seniors still tend to be more male than female and have higher education and higher income than offline seniors, but their number grows rapidly every year (Boulton-Lewis, Buys, Lovie, Barnett, & David, 2007; Pew Internet and American Life, 2007). The “silver surfer” discourse reinforces the notion that older adults stand to benefit from Information and Communications Technologies (ICT) in various ways. Previous research has identified a host of utilities of ICT for older adults. The main functions described are (a) Communication medium—ICT are used for maintenance of SNs with family and friends, as well as a tool for making new friends, and help removing geographic and transportation limits, (b) Information source—increased access to current affairs, health and medical information, consumers’ information, online courses, and so forth, (c) Task-oriented tool (e.g., shopping, financial management, and travel planning), and (d) Leisure activity—older adults use many leisure activities offered by the web, such as family trees, photo albums, games, and virtual hobbies (Cody, Dunn, Hoppin, & Wendt, 1999; Iyer & Eastman, 2006; Kiger, 2006; Loges & Jung, 2001; Opalinski, 2001; Pew Internet and American Life, 2004; White et al., 1999; White & Weatherall, 2000; Xie, 2007b). Moreover, older persons involved in the virtual world relate to their computer as an independent presence in their homes and tend to attribute human qualities to it, as if it is a component in their SN (Blit-Cohen & Litwin, 2004; Kadlec, 2007).

In addition to the practical benefits of using the Internet, it seems to have a strong impact on older adults’ well-being. Learning computer and Internet skills enhances a sense of independence (Henke, 1999) and creates a process of empowerment (transition from helplessness to control and from passiveness to activeness) as a result of the power of change and the power of knowledge (Fuglsang, 2005; McMellon & Schiffman, 2002; Shapira, Barak, & Gal, 2007). Internet use seems to have a role in maintaining SN and PWB. It is associated with higher levels of social connectivity, higher levels of perceived social

support, decreased feelings of loneliness, lower levels of depression, and generally more positive attitudes toward aging (Cody et al., 1999; Dickenson & Hill, 2007; Fokkema & Knipscheer, 2007; Nahm & Resnick, 2001; Van De Watering, 2005; White et al., 2002). In addition, involvement in the virtual world, according to Furlong (1989), is likely to strengthen the self-image and self-confidence of elderly people. In spite of all that, some studies indicate that computer use has not shown any impact at all on elderly well-being. The bias, according to the researchers, is caused by not separating between the effects of computer use and the effects of the training process (Dickinson & Peter, 2006; Gilleard, Hyde, & Higgs, 2007; Slegers, Van Boxtel, & Jolles, 2007).

Although an increasing number of older adults enjoy the benefits of ICT, for most seniors, the information available on the web is out of reach since they lack computer access. This problem is usually described as *The Digital Divide*, and it results from various cultural and technical barriers, such as computer’s costs, not knowing how to use it, fear of modern technology (technophobia), lack of available training and technical support, lack of perceived need, and difficulties with reading the small letters in Web sites. The Digital Divide is a main concern for many studies that examine the barriers and limitations for participation, intervention programs, and their effect on participant’s well-being (e.g., Bradley & Poppen, 2003; Campbell & Wabb, 2003; Cody et al., 1999; Kiel, 2005; Loges & Jung, 2001; Ownby, 2006; White et al., 2002; Xie, 2007a). However, it has also been argued that even those who use Internet resources face difficulties in locating authoritative and reliable electronic-based information and more senior-friendly Web sites (Broering, Chauncey, & Gomes, 2005; Curran, Walters, & Robinson, 2007; Voelker, 2005).

Studies that focus on older adults with chronic health conditions (which include both chronic diseases and impairments) tend to emphasize two types of ICT usages: (a) health information and (b) support. The Internet makes it easier for patients and caregivers to access medical expertise and technology (Madan & Bodagh, 2002). Access to reliable online health information has been linked to reduced anxiety, increased feelings of self-efficacy, and to a decrease in utilization of ambulatory care (Ybarra & Sumanb, 2006). Online support is associated with various types of web-based communication technologies: *e-mails, discussion mailing lists, newsgroups, forums or message boards, bulletin boards, chat-groups, interactive sites, blogs*, and similar online

media. In the past few years, some pioneering attempts were made to explore the impact of online communities on people with certain chronic health conditions and their caregivers (e.g., Hoybye, Johansen, & Tjornhoj-Thomsen, 2005; Lorient, 2003; Nycz & Redsell, 2006). These studies indicated that online communities have a positive effect on participants' well-being and health care behavior.

Parallel to the health-related communities, there is a growing number of general seniors' online communities that do not focus on any particular health condition. The most popular communities are very active, and some of them have hundreds and even thousands of members. These communities hold a range of potential benefits for their participants, including increasing communication and expanding SNs, information exchange, and emotional support. However, so far, no study has examined the content of these communities nor their contribution to the users. The exploratory study described in this article aimed to take the research of seniors' online communities one step forward and provide some missing information in the current body of knowledge. The main goal of this study is to explore the contents and characteristics of these communities. Specifically, it was designed to answer the following questions:

1. What are the key trends in seniors' online communities in terms of level of activity?
2. What are the main subjects discussed in these communities?
3. What is the overall tone of the discussions? Is it more positive than negative or vice versa?

By addressing these questions, this relatively new phenomenon was further explored and assumptions

regarding the communities' potential impact on older adults' SNs and well-being could be drawn.

Design and Methods

Quantitative content analysis of 14 leading online communities was performed using a novel computerized system, the Forum Monitoring System (FMS), designed especially for online forum analysis. The FMS system is owned by 1st2c Ltd. (Hod Hasharon, Israel), a commercial company, and was developed by Trifeed Ltd (Tel Aviv, Israel). It enables combining qualitative and quantitative methods of content analysis and assists in monitoring the level of activity over time, outputting basic numeric values regarding sizes and shares of messages, examining the discussions' tone, and creating a basic graphical presentation for the results.

Data Collection and Sampling

The research team searched the web and identified more than 40 online communities, which, according to their names, home pages, and welcome posts, explicitly target seniors. Each forum and chat was reviewed, and those that were relatively new or nonactive (less than a few hundred posts) and/or required registration were screened out (to avoid ethical issues). Given the public nature of online forums, the study was approved as exempted from human subjects review.

The final sample consisted of 14 established communities (see Table 1). Seven of the communities were from the United States, four were British, two were Canadian, and one was Australian. However, all of them except for one (*Florida Retirement Forums*) targeted a global audience. Two communities

Table 1. The Seniors' Online Communities Examined in this Study

Community name	Address	Community type	Center
50 plus	http://discuss.50plus.com	Forum	Canada
About seniors	www.seniors-forums.com	Forum	Australia
Age-net	www.age-net.co.uk	Forum + Chat	UK
Cool grandma	www.coolgrandma.com	Forum + Chat	USA
Early Retirement Forum	www.early-retirement.org	Forum	USA
IDF (I don't feel) 50	www.idf50.co.uk	Forum	UK
Florida Retirement Forums	www.kelleytown.com	Forum	USA
Pensioners Forum	www.pensionersforum.co.uk	Forum	UK
Retired magazines	www.retiredmagazines.co.uk	Forum	UK
Retirement community	www.retirementcommunity.com	Forum	USA
Senior-net	www.seniornet.org	Forum	USA
Seniors daily	www.seniorsdaily.net	Forum	Canada
The Little-Brown-Jug Forum	www.little-brown-jug.com	Forum	USA
The over 50 golden group	http://theover50goldengroup.net	Forum	USA

had both a forum and a chat room, and the rest had a forum only.

The study followed a full year of activity in these communities, between April 1, 2007, and March 31, 2008. The overall database included 19,963 threads (i.e., discussions, stream of posts concerning the same topic and with the same opening post) and 686,283 posts (i.e., messages). The number of authors was 79,665.

Data Analysis

After downloading the messages from the Internet sites and saving them in a database, the software's Graphical User Interface was used to track how the posting was distributed over time. The next step was open coding. The database was divided among three investigators (the author and two research assistants). Each one of them, separately, carefully scrutinized the data and created a list of subjects discussed in the online communities. A list of subcategories was created for each category of subjects discussed, and a list of synonyms, including all possible variations, was created for each term. When all three lists were ready, they were compared and merged into one final list. When comparing the three lists, there was an absolute agreement among the assessors regarding the main categories and about 80% overlap in the lists of subcategories. All identified subcategories, even those that were relatively rare, were included in the final list. This list was installed in the software and was used for creating sets of messages discussing similar topics. All the posts, which included terms that were identified with a specific category and/or subcategories, were grouped into a set of messages. Posts related to several subjects were included

in all relevant sets, leading to a certain level of overlapping between the sets.

The final step was using the software's Engagement Analyzer to examine the database's tone. Tone analysis is based on measuring the proportion between positive expressions (words expressing good emotions and thoughts) and negative expressions (words expressing negative emotions and thoughts), based on the frequency and the intensity of more than 2,000 defined expressions. This measurement was developed by 1st2c Ltd. It is based on providing each expression a value ranging from -3 to 3 based on its content (positive or negative) and intensity (low, medium, or high). For example, terrible = -3, good = 1, wonderful = 3. Jury method was used to determine final values. The outcome of comparing the frequency of positive and negative expressions was the *Sentiment Balance Index*. This index indicates proportion only. The outcome of comparing the intensity of positive and negative expressions was the *Emotional Engagement Balance*, which was based on averaging the emotional intensity score attached to each sentiment term. This indicates how intense the positive terms are compared with the negative terms used. The final *Emotional Engagement Score* is the composite average of all emotional intensity scores attached to each sentiment term, based on their frequencies.

Results

Trends in Seniors' Online Communities

During the research period, there was a constant increase in the daily activity level, in terms of number of active posters and threads in each day, and, as a result, in terms of daily message volumes. As can be seen in Figure 1, there seem to be three subperiods:

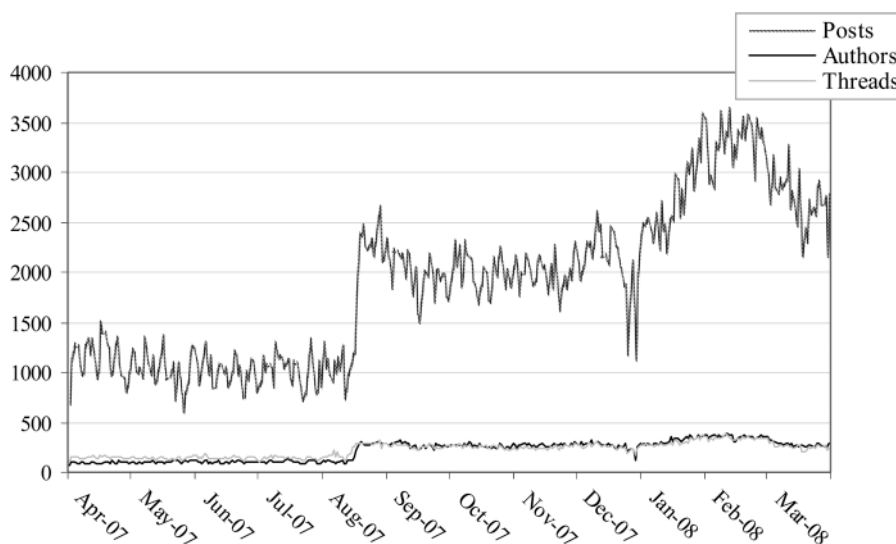


Figure 1. Trend lines in activity level.

Table 2. Subperiods' Descriptors and Activity Indicators

Period	April to mid-August, 2007	Mid-August to December, 2007	January to March, 2008
Average number of threads per day	146	255	298
Average number of authors per day	102	267	317
Average number of posts per day	1036	2028	2906
Authors per thread rate	0.70	1.04	1.06
Posts per thread rate	7.1	7.9	9.7
Posts per author rate	10.2	7.6	9.2

April to mid-August 2007, mid-August to end of December 2007, January to end of March 2008.

Comparing the average number of threads, authors, and posts per day in each subperiod separately (Table 2) reveals that the number of threads has been doubled and the number of authors and posts has been tripled during the research period. There were also significant changes in the activity indicators, which examined the proportion between the daily averages. These indicators showed that there was some increase in the number of participants in each discussion (authors per thread rate) and a significant increase in the level of activity in each thread (posts per thread rate). However, there was some decrease in the posts per author rate, indicating that the “newcomers” were relatively less active posters than early participants.

Main Subjects Discussed

Content analysis identified 13 main subjects discussed in the communities. As shown in Figure 2, the most popular subject, with more than 140,000 posts, was what may be described as “Fun on line.” It includes funny stories and jokes that people share with each other, as well as online games, riddles, and so forth.

The second most discussed subject was “Retirement,” with more than 94,000 posts. This includes discussions of retirement rights, pensions, relocation, and so forth. “Family” is in the third place, with more than 77,000 posts concerning spousal relationships, parenthood, and grandparenting. The fourth place was held by “Health,” with more than 56,000 posts dealing with both sickness (e.g., medical conditions, medicines) and wellness (e.g., nutrition, beauty). This was followed by two occupational subjects: “Work and Study,” with more than 50,000 posts that relate to possible occupations for retirees, including jobs and courses, and “Recreation,” with more than 48,000 posts that mostly include recommendations of books, films, shows, TV programs, and so forth.

Less discussed, yet containing a considerable amount of messages, are the subjects of “Finance,” “Religion and Spirituality,” “Technology,” “Aging,” “Civic and Social,” “Shopping,” and “Travels.” Examples of active discussions in each of the aforementioned sets of messages are presented in Table 3.

The Overall Tone

Tone analysis of the full data set shows that terminology features not only significant usage of

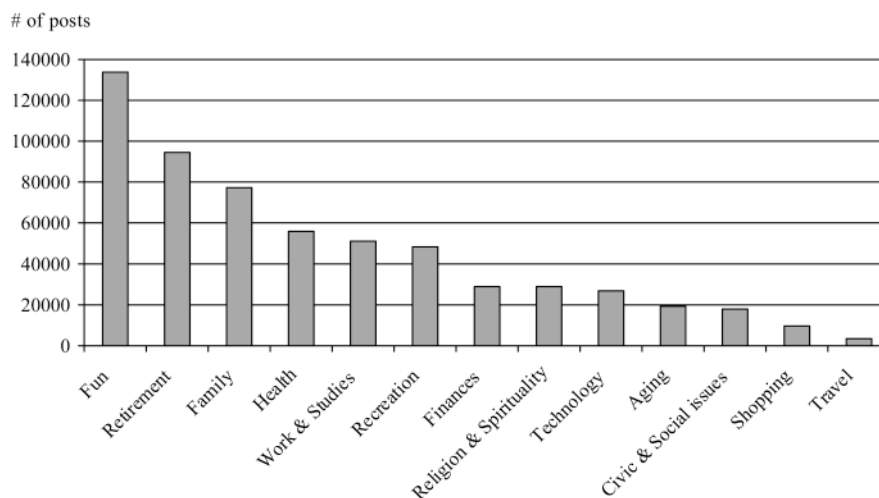


Figure 2. Most discussed subjects.

Table 3. Examples for Active Discussions in Each Set of Messages

Subject	Headline	Content
Fun on line	Tell us some quotes, anything will do What's next?	All kind of quotes First player posts a short phrase. Next player uses the last word of that phrase to start a new phrase
Retirement	It's funny joke Thursday Where to retire? How much is enough? Retirement ideas and making the transition to retirement	Jokes Places to live in after retirement When to retire What has worked out, what hasn't, things people wish to do or wish they did, etc.
Family	Grandma's ethics Are you and your mate affectionate? Hurting, excluded from son's birthday get-together	Genealogy. Humorous or poignant writings found in research of family histories Long conjugal relationships Painful family relations
Health	Flu shot, best time to get it? Walking, hiking, jogging, swimming, biking Diabetes	Advices concerning flu shot Physical activity Symptoms, medications, and other related issues
Work & Study	Companies that hire seniors Beware of Tim Horton's jobs Want to learn Spanish	Links and names Retired people exploitation in new job Advices, advantages, and challenges of picking up a new language
Recreation	What are you reading right now? ER forum cookbook American idol	People telling about books they have read Recipes Discuss the TV show
Finances	ISM/OSM yet again Street smart Making ends meet	Stock market explanations Investing in general and various investments or types of investments How to have the financial resources needed for the active life of retirement
Spirituality	Bible punchers, Christianity Agnostics and atheists	New calculations for believers Thoughts about and understandings of atheism and agnosticism
Technology	Wiccan chants E-mail Software—Windows 95/98/ME/Win2000/ WinXP/Vista Cameras—digital, video, still, and web cam	All kind of chants for different purposes Questions, problems, and comments regarding e-mail Questions, tips, and problems encountered using Windows Questions and experience with digital cameras
Aging	Aging issues Memories. . .youth/life Dying and end of life issues	Experiences and views of getting older A memories album for the next generations Views of death and dying and issues related to the end of life (e.g., hospice, funeral arrangements, etc.)
Social issues	Elections candidates and issues Iraq, Pakistan, and the Middle East Gullible warming	Discussing the 2008 elections Conflicts and events in the Middle East Environmental issues, global warming, and weather
Shopping	If you were buying a car Seniors discounts Cheap notebooks	What kind of car should one buy All kinds of discounts for seniors Cheap computer deals
Travel	Senior's tours Travel medical insurance Travel by RV/camping	Tips about specific tours company Stories of good and bad experiences with travel medical insurance companies Questions and stories of travels with Recreational Vehicles and camping

Note: ER = Early Retirement; RV = Recreational Vehicle.

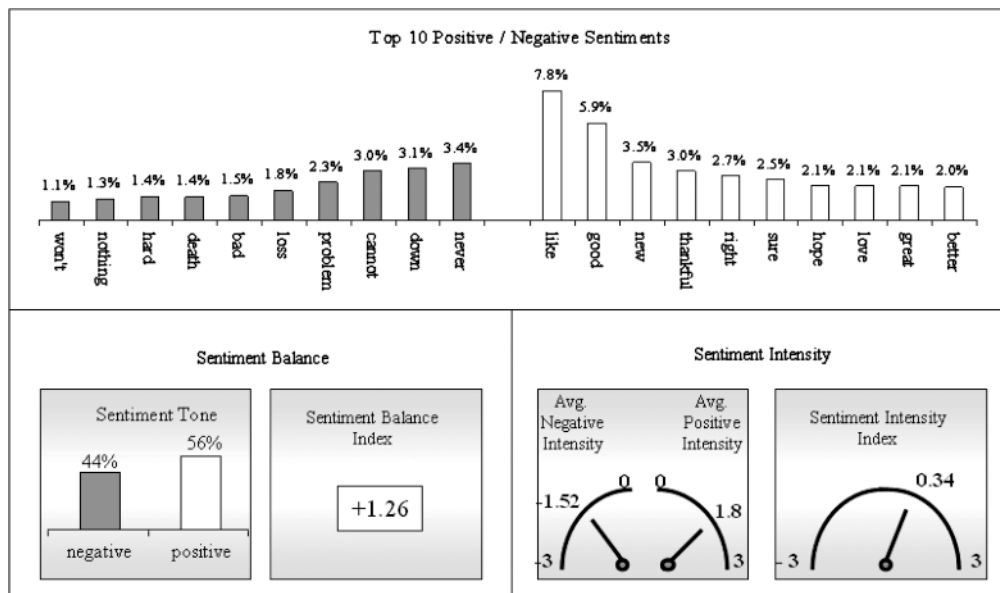


Figure 3. The tone in seniors' online communities. *Notes.* Sentiment intensity is calculated for both positive and negative terminology used. It is based on averaging the emotional intensity score attached to each sentiment term. Sentiment intensity index is the composite average of all emotional intensity scores attached to each sentiment term.

general positive expressions (e.g., good, great) but also many words expressing difficulties and pain (e.g., problem, loss). As can be seen in Figure 3, the *Sentiment Balance Index* for the surveyed communities stood at a ratio of 1.26:1 in favor of positive terminology (i.e., 1.26 positive for every single negative term). The *Emotional Engagement Balance* of sentiment-loaded terminology was more positive than negative (i.e., the intensity of the positive terms was higher than the intensity of the negative terms, 1.8 vs. -1.52). However, there seems to be an overall balance in tone, as the final composite average, the *Emotional Engagement Score*, was 0.34.

Discussion

The innovative software used in this study offered a promising opportunity to study seniors' online communities. However, because the analysis primarily relied on a linguistic basis, inaccuracies may have occurred, especially in analyzing the main discussed subjects. One type of inaccuracy could result from including an irrelevant post in a set of messages just because it contained a specific term. The other type of potential mistake could be the omission of a relevant post in a set of messages because it did not contain any of the specific terms associated with the subject in the categories' lists. Therefore, findings should not be treated as absolute, but rather as indicators of general trends. Another limitation is associated with the fact that the software can only

be used for analyzing English-based communities. Therefore, they mostly represent communities of relatively well-to-do seniors from western countries. Nevertheless, the findings lead to several new understandings regarding this relatively new social phenomenon of online communities of older adults.

One of the most significant finding is that seniors' online communities are increasingly gaining popularity. In fact, in 1 year only, the average daily level of activity in these forums has doubled and the number of active participants in each day has tripled. This growth may be partly explained by the increase in the number of seniors using ICT (Boulton-Lewis et al., 2007; Pew Internet and American Life, 2007), but the main explanation is, probably, that more and more seniors, not only new "surfers," try these communities, like the experience, and become active members. The fact that the new participants are relatively less active writers than early participants suggests that the communities now attract more diverse audiences. It seems that the communities now include more introverted individuals and/or more occasional visitors.

The amazing growth rates lead to several questions: Why do the communities become so popular? What do seniors like about them? And what functions do the communities fill in their members' lives? Although direct answers to these questions may only result from qualitative content analysis and interviews with participants, assumptions may be drawn from examining the

subjects discussed in the communities and the discussions' tone. The communities seem to serve as a stage for discussing every possible subject, ranging from very *private* subjects, such as problematic relationships or fear of death, to *public* subjects such as global warming or politics. Subjects range from very *serious* (e.g., employees' exploitation) to very *casual* (e.g., jokes), and although some of them are *exclusive* for seniors (e.g., aging, retirement rights), many of them are *general*. With more positive than negative but overall a pretty balanced tone, it seems that the communities also enable expressing a wide range of emotions, ranging from very *negative* (e.g., sadness, anger, grief) to very *positive* (e.g., happiness and playfulness).

Apparently, the utilities of ICT for older adults identified in previous research (e.g., Cody et al., 1999; Opalinski, 2001; Xie, 2007b) are just as relevant for seniors' online communities. The communities serve as (a) Communication medium—they are used as a tool for making new friends and help removing geographic and transportation limitations, (b) Information source—participants share information regarding health and medical information, consumers' information, technology, and so forth, (c) Task-oriented tool (e.g., shopping, financial management, and travel planning), and (d) Leisure activity. The latter function seems to be central. Participating in an online community is a free-time activity that involves social interactions, intellectual challenges, and a creative outlet. In addition, the most active threads are those that offer Fun on line (games, jokes, funny stories, etc.), a fact that suggests that seniors enter the community when they feel like playing, having fun, and enjoying an entertaining experience. Moreover, the communities also serve as a resource in learning about leisure services and planning leisure activities, as many posts deal with recommendations relating to recreation, shopping, and travels.

It is possible to conclude that the major reason for the increased popularity of the online communities is that they provide enjoyable interactions, entertaining activities, and practical information. However, there are other possible explanations as well. Joining online communities may provide an expansion of existing real-life SN and/or a compensation for lost friendships as a result of various constraints. It may even be described as an additional strategy to the strategies of compensation described by Jerrome and Wenger (1999). Therefore,

based on SNs literature, online communities may also provide (e) Social support, which is crucial for well-being in later life (Antonucci & Akiyama, 1991; Avlund et al., 2004; Krause, 1987; Nunn, 1996; Rowe & Kahn, 1998). The findings show that there are active discussions of subjects, such as retirement, family, and health in the seniors' online communities. This suggests that when facing later-life transitions (e.g., retirement) and losses (e.g., spousal loss or declining health), seniors find comfort in *sharing* their emotions online with peers, who may have been through similar experiences and can provide understanding and good advice. In addition, the dominance of Fun on line suggests that these communities also offer *relief and distraction* from stressful circumstances. When feeling bored, sad, or lonely, one can avoid these feelings by chatting and playing with other online friends.

Research has suggested that active engagement in leisure activities and maintaining a supportive SN may be considered as a coping strategy while adjusting to the changes associated with aging and while facing negative life events (Antonucci & Akiyama, 1991; Iwasaki & Mannell, 2000; Zuzanek, Robinson, & Iwasaki, 1998). Social interactions and leisure activities are important in creating and maintaining or possibly even reconstructing a sense of self that has been disrupted (see Kleiber, 1999, for a review). Their value has been described in three areas—self-protection, self-restoration, and personal transformation—suggesting that they can buffer the impact of negative life events by being distracting, by generating optimism about the future, by facilitating in the reconstruction of a life story that is continuous with the past, and by being vehicles for personal transformation (Kleiber, Hutchinson, & Williams, 2002; see also Iwasaki, 2003; Iwasaki & Schneider, 2003).

The seniors' online communities offer both leisure activity and a supportive SN. Although online SNs are probably quite different from real-life SNs, and the specific qualities of the relationships they provide are yet to be studied, they are mostly friend-dominant. Based on SN literature (e.g., Litwin, 1999; Pinquart & Sorensen, 2000; Siebert et al., 1999), this suggests a strong impact on PWB. Therefore, it is suggested that they may be regarded as a *coping resource*. The online communities may contribute to (f) Self-preservation—by communicating with people from the same cohort and with people who confront similar problems may

provide self-reassurance and preserve a sense of “normality”; and being able to support others may preserve a sense of being needed. In addition, getting to know people from around the world and discussing current affairs such as the conflicts in the Middle East as well as philosophical and spiritual subjects, seniors can preserve a sense of connectedness. They may feel that they are still an active part of society, a sense that may be threatened by retirement and by declining health (especially when the person is homebound). Participating in the communities can also serve as an (g) Opportunity for self-discovery and growth. Most communities’ participants use pseudonyms and do not tend to provide identifying details. This anonymity may enable expressing thoughts and emotions never expressed before and experiencing new roles and relationships.

Leisure activities and supportive SNs are key factors in explaining the well-being of older adults and successful aging (e.g., Antonucci & Akiyama, 1991; Avlund et al., 2004; Gabriel & Bowling, 2004; Krause, 1987; Nimrod, 2007; Nunn, 1996; Rowe & Kahn, 1998). Because seniors’ online communities offer both leisure activity and an expanded SN, and based on the contents discussed in the communities and the aforementioned potential benefits, it is suggested that active participation in the communities may contribute to the well-being of older adults. Online communities may be used as a powerful tool that helps older adults to cope with stress, losses, and negative events, and to protect, restore, and even transform their self-perceptions.

These suggestions, as well as seniors’ participation patterns, preferred subjects, perceived benefits, and constraints on participation, should all be further investigated using both qualitative and quantitative methods. Future research should explore how seniors learn about the communities and how to become engaged with them and investigate the quality of the relationships created in the communities compared with real-life relationships. Future research should also explore differences between younger and older participants in online communities, and between subgroups among seniors (based on gender, age, ethnicity, occupation, health status, etc.) and examine whether participating in online communities contributes to older adults’ well-being in various dimensions (e.g., levels of depression, satisfaction with life, self-image, self-confidence, and attitudes toward aging) by comparing par-

ticipants and nonparticipants. If significant differences are found, the next challenge should be exploring what inhibits the nonparticipants from participating and finding ways to encourage them to join these communities. A follow-up study could be able to explore whether having more diverse audiences (i.e., not only relatively well-to-do older adults) will yield a shift in contents and tone.

Applied Implications

Although there is still a lot of ground to be covered, and there are still many questions to be answered by further research, the current study provides several practical implications. A first set of implications is for practitioners working with older adults. They can promote their awareness to seniors’ online communities, and they can encourage people who face insufficient SNs and loneliness to try out these communities. In addition, Internet and computer skills courses should include, on top of basic skills, guidance on how to search for online communities and how to participate in them. These simple steps may help seniors enjoy the many benefits that the communities seem to offer and, to some extent, enhance their sense of well-being.

The findings may also be useful for the administrators and moderators of seniors’ online communities. When designing a community, they can create forums designated for each one of the main topics of discussion identified in this study. Moreover, in the “fun” section, they can create subsections for games, jokes, and funny stories; in the “social subjects” section, they can create subsections for “local,” “national” and “international,” affairs, and so forth. They can create “sticky” posts (that always appears at the top regardless of the date and time posted) for repeated subjects (e.g., “e-mail”), and they can also initiate discussions and introduce new games.

Funding

The Burda Center for Innovative Communications at Ben-Gurion University of the Negev.

Acknowledgments

The author wishes to express her appreciation to 1st2c for letting her use the Forum Monitoring System. Also, special thanks to the research assistants Sigal Naim and Naama Shaked-Levi.

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Received August 6, 2009

Accepted October 6, 2009

Decision Editor: William J. McAuley, PhD